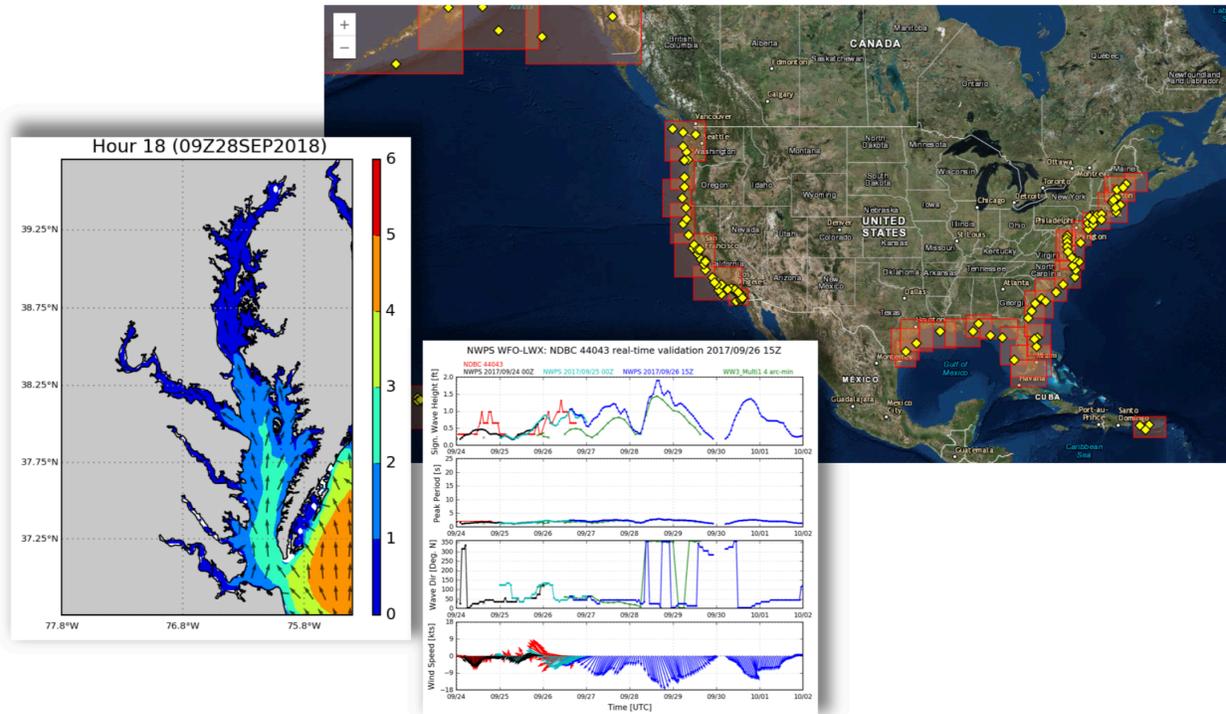


# Nearshore Wave Prediction System



The Nearshore Wave Prediction System (NWPS) provides on-demand, high-resolution nearshore wave model guidance to US coastal Weather Forecast Offices, triggered in real time by these forecast offices.

NWPS is driven by forecaster-developed wind grids and offshore wave conditions from NOAA's global wave model WAVEWATCH III. Wave-current interaction is included using surface currents from the Real-Time Ocean Forecast System (Global RTOFS). Tides and storm surge are accounted for using the Extratropical Surge and Tide Operational Forecast System (ESTOFS, extratropical conditions), or the probabilistic model PSURGE (tropical conditions). The computational grids have a nearshore resolution of 1.8 km-100 m. NWPS produces fields and time series of integral wave parameters, wave spectra, and individually tracked wave systems (Gerling-Hanson plots). Typical output quantities predicted are:

- Significant Wave Height (average of highest third of all waves)
- Peak Wave Period
- Mean Wave Direction

For more details, please visit <http://polar.ncep.noaa.gov/nwps/index.shtml> or contact [Andre.VanderWesthuisen@noaa.gov](mailto:Andre.VanderWesthuisen@noaa.gov)